

REMARKS

Claims 2-6, 8-21, 23, and 25 have been amended to clarify the language of the claims. The subject matter of claim 7 has been incorporated into claim 6. Claims 1-5, 10-21, and 25 have been withdrawn as being directed to a non-elected invention. Claims 7, 22, 24, and 26 have been canceled. After amendment herein, claims 1-6, 8-21, 23, and 25 will be pending. No new matter has been added by these amendments.

Rejections Under 35 U.S.C. § 112, second paragraph

Claims 6-9 and 23 stand rejected under 35 U.S.C. § 112, second paragraph, as being indefinite.

The Examiner alleges that the use of the term "comprising" renders the claims indefinite because "the claim(s) include(s) elements not actually disclosed (those encompassed by 'comprising'), thereby rendering the scope of the claims(s) unascertainable." Office action at page 4. Applicants respectfully submit that the claims are definite. The transitional term "comprising" is valid and appropriate. "The transitional term 'comprising', which is synonymous with 'including,' 'containing,' or 'characterized by,' is inclusive or open-ended and does not exclude additional, unrecited elements or method steps." MPEP § 2111.03. One of skill in the art would immediately envisage the scope of the claims, as claim 6, as amended, is directed to a polyamido moiety comprising at least one unit of formula II, wherein said unit of formula II is bound to one or more other units. Applicants respectfully request withdrawal of the rejection.

The Examiner alleges that "it is not clear what 'phenylene and arylene groups derived from C₅ heteroaryl' means." Office action at page 5. Claim 8 has been amended to clarify that the A and B may be independently selected from phenylene, and heteroarylene groups derived from C₅ heteroaryl groups having one or two heteroatoms. The phrase "derived from C₅ heteroaryl groups having one or two heteroatoms" modifies "heteroarylene." Both phenylene and heteroarylene groups are arylene groups, as defined in the specification as originally filed at least at paragraphs [0037] to [0061]. Applicants respectfully request withdrawal of the rejection.

The Examiner alleges that the letters (G) and (K) in claim 7 are not understood. Applicants have cancelled claim 7 without prejudice. Applicants submit that the amendment renders the rejection moot and respectfully request withdrawal of the rejection.

Rejections Under 35 U.S.C. § 102

Claims 6-9 and 23 stand rejected under 35 U.S.C. § 102 as being anticipated by Dupont et al. (Tetrahedron Lett. 2000, 41(31): 5853-5856). Claim 6 has been amended to incorporate the elements of claim 7, with claim 7 being cancelled. As amended, claim 6 recites "[a] polyamido moiety comprising at least one unit of formula II: -CO-A-B-NH- (II) wherein: A is an optionally substituted C₅₋₆ arylene group; B is an optionally substituted C₅₋₆ arylene group; wherein said unit of formula II is bound to one or more other units selected from: (i) units of formula II; and (ii) amino-heteroarylene-carbonyl units of formula III: -CO-E-NH- (III) wherein E is either optionally substituted C₅₋₂₀ heteroarylene or C₈₋₁₀ heteroarylene-C₅₋₂₀ arylene." Applicants submit that Dupont et al. does not disclose a polyamido moiety, containing a unit of formula II bound to one or more other units, as recited in claim 6. The Examiner relies upon compound 12 in Table 1 of Dupont et al., which is not a polyamido moiety, containing a unit of formula II bound to one or more other units. Dupont et al. does not disclose all the elements of claim 6. Hence, Dupont et al. does not anticipate claim 6. Claims 8-9 and 23 depend from claim 6. Hence, claims 8-9 and 23 are patentable over Dupont et al. for at least the same reasons cited for claim 6. Claims 8-9 and 23 may be allowable for additional reasons not discussed herein. Applicants request withdrawal of the rejections.

Rejections Under 35 U.S.C. § 103

Claims 6-9 and 23 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over US 2004/0138269 ("the '269 Application"). As stated above, claim 6 has been amended to incorporate the elements of claim 7, with claim 7 being cancelled. As amended, claim 6 recites "[a] polyamido moiety comprising at least one unit of formula II: -CO-A-B-NH- (II) wherein: A is an optionally substituted C₅₋₆ arylene group; B is an optionally substituted C₅₋₆ arylene group; wherein said unit of formula II is bound to one or more other units selected from: (i) units of formula II; and (ii) amino-heteroarylene-carbonyl units of formula III: -CO-E-NH- (III) wherein E is either optionally substituted C₅₋₂₀ heteroarylene or C₈₋₁₀ heteroarylene-C₅₋₂₀ arylene." Applicants submit that the '269 Application does not disclose a polyamido moiety, containing a unit of formula II bound to one or more other units as recited in claim 6. The Examiner relies on the compounds in claim 5 and Example 42 of the '269 Application, but neither is a polyamido moiety, containing a unit of formula II bound to one or more other units as recited in claim 6. The '269 Application does not disclose all the elements of claim 6. Hence, the '269 Application does not anticipate claim 6. Claims 8-9 and 23 depend from claim 6. Hence, claims 8-9 and 23

are patentable over the '269 Application for at least the same reasons cited for claim 6. Claims 8-9 and 23 may be allowable for additional reasons not discussed herein. Applicants request withdrawal of the rejections.

Claims 6-9 and 23 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over the '269 Application in view of Wolff, M.E. *Burger's Medicinal Chemistry 4th Ed. Part I*, Wiley: New York, **1979**, 336-337 ("Wolff"). As stated above, the '269 Application does not teach or suggest a polyamido moiety, containing a unit of formula II bound to one or more other units as recited in claim 6. Wolff does not complete the deficiencies of the '269 Application. The '269 Application and Wolff, either individually or in combination, do not teach or suggest all the elements of claim 6. Claim 6 is patentable over the '269 Application in view of Wolff. Claims 8-9 and 23 depend from claim 6. Hence, claims 8-9 and 23 are patentable over the '269 Application in view of Wolff as well. Claims 8-9 and 23 may be allowable for additional reasons not discussed herein. Applicants request withdrawal of the rejections.

Specification Objections

The Abstract stands objected to "because: a) it neither provides for the general nature of the compounds nor exemplifies any members for formulae illustrative of its class; and b) should be amended to reflect the scope of the *Requirement for Restriction/Election of Species*." Office action at pages 11-12. Applicants have amended the Abstract to clarify the scope of the application and reflect the scope of the restriction requirement and election. Support for this amendment may be found in the application as originally filed at least in the claims and at page 1, lines 3-5 and page 2, line 10 through page 5, line 4. Applicants submit the amendments presented herein render the objection moot, and Applicants respectfully request withdrawal of the objection.

The Title stands objected to, as the Examiner alleges that "the title of the invention is not descriptive." Office action at page 12. Applicants submit that the title of the application, "Biaryl Amino Acids and Their Use in Dna Binding Oligomers," as indicated on the Application Data Sheet, does indeed describe the invention in sufficient detail. The Examiner suggests including the name of the main core of the chemical structure and the alleged utility. Applicants submit that as amended, claim 6 recites "[a] polyamido moiety comprising at least one unit of formula II: -CO-A-B-NH- (II) wherein: A is an optionally substituted C₅₋₆ arylene group; B is an optionally substituted C₅₋₆ arylene group . . ." and hence, describes a biaryl amino acid. As described in at

least paragraph [0001] of the specification, an alleged use of the polyamido moiety is to interact with DNA. Applicants respectfully submit that the Examiner's objection is unfounded and request withdrawal of the objection.

Claim Objections

Claims 7-9 stand objected to for various informalities. Applicants submit that independent claim 1 already begins with "A." Applicants have amended dependent claims 2-5, 8, and 10-21 to begin with "The." Claim 7 has been cancelled. Applicants have correspondingly amended dependent claims 9, 23, and 25. Applicants submit the amendments presented herein render the objection moot, and Applicants respectfully request withdrawal of the objections.

Claims 7-9 stand objected to under 37 CFR 1.75(c), as being of improper dependent form. The Examiner alleges that claims 7-9 do not further limit the subject matter of the previous claim. Applicants have cancelled claim 7. Applicants submit that dependent claims 8-9 indeed do further limit the subject matter of independent claim 6. Claim 8 recites "[t]he polyamido moiety according to claim 6, wherein A and B are independently selected from phenylene, and heteroarylene groups derived from C₅ heteroaryl groups having one or two heteroatoms." Claim 8 further limits claim 6 by narrowing the genus of embodiments of A and B. Claim 9 recites "[a] compound comprising the polyamido according to claim 6." Claim 9 further limits claim 6 by reciting that the polyamido moiety is comprised within a compound. Applicants respectfully request withdrawal of the objections.

Claims 6-9 and 23 stand objected to for containing non-elected subject matter. As the Examiner acknowledges on page 2 of the Office action, Applicants elected Group II, claims 6-9 and 23, drawn to polyamido products of formula (II) -CO-A-B-NH-. Applicants have cancelled claim 7. Applicants submit that claims 6, 8-9, and 23 do indeed relate to formula (II) and include formula (II) in the language of the claim. Applicants respectfully submit that the Examiner's objection is unfounded and request withdrawal of the objection.

Rejoinder

Applicants respectfully request rejoinder of claims 10-21. Claims 10-21 depend indirectly from claim 6. Hence, they include a polyamido moiety of formula (II).

CONCLUSION

In light of the amendments and remarks presented herein, Applicants submit that the claims are patentable and respectfully request allowance of the claims.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Charlene L. Yager". The signature is fluid and cursive, with the first name "Charlene" being more prominent.

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